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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/730,607	12/07/2000	Masaru Sugano	001615	9246

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EXAMINER

ABEBE, DANIEL DEMELASH

ART UNIT PAPER NUMBER

2626

DATE MAILED: 08/29/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/730,607

Applicant(s)

SUGANO ET AL.

Examiner

Daniel D. Abebe

Art Unit

2626

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7 and 9-26 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 7,9,16,17 and 19-26 is/are allowed.
- 6) ☒ Claim(s) 1,13-15 and 18 is/are rejected.
- 7) ☒ Claim(s) 2-6,10,12 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____ | 6) <input type="checkbox"/> Other: ____ |

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1, 13-15 and 18 are rejected under 35 U.S.C. 102(e) as being anticipated by Vaithilingam et al. (6,411,724).

As to claim 1, Vaithilingam teaches a multi media compressed or uncompressed data description scheme, .D.S., comprising the steps of;

Extracting distinctive features from compressed or uncompressed data, assigning descriptors, clustering the data based on descriptors and hierarchically describing the multi media meta data (Fig.2).

According to Vaithilingam the audio feature hierarchical description scheme of audio data is explained on Col.11, lines 15-45.

“ General requirements for descriptors and description schemes as proposed in the aforementioned MPEG-7 Requirements Document are supported by suitable descriptors and their meta-descriptors. Multiple types of features--suitable descriptors and their meta-descriptors support multimedia descriptions using various types of features such as: N-dimensional Spatio-temporal structure (e.g., the duration of a music segment), objective features (e.g., the number of beds in a hotel, color of an object, shape of an object, audio pitch, etc.), subjective features (e.g., how nice, happy or fat

someone is, topic, style, etc.), production features (e.g., information about document creation such as the date of acquisition, producer, director, performers, roles, production company, production history, any non-IPMP production information), composition information (e.g., how a scene is composed, editing information, the user's preferences, etc.), and concepts (e.g., event, activity). **Abstraction levels for the multimedia material**--hierarchical mechanism to describe multimedia documents at different levels of abstraction are supported, which accommodates users' needs for information at differing levels of abstraction such as, for example, the composition of objects from sub-objects, a sequence by sequence analysis of motion in a video, and the plot structure of a video. **Cross-modality**--audio, visual, or other descriptors and their meta-descriptors that allow queries based on visual descriptions to retrieve audio data and vice versa are supported (for example, where the query is an excerpt of Pavarotti's voice and the result is retrieval of video clips where Pavarotti is singing and where Pavarotti is present). **Multiple descriptions**--the ability to handle multiple descriptions of the same material at several stages of its production process is supported, as well as descriptions that apply to multiple copies of the same material. **Description scheme relationships**--suitable description schemes express the relationships between descriptors and their meta-descriptors to allow for their use in more than one description scheme. The capability to encode equivalence relationships between descriptors and their meta-descriptors in different description schemes is supported. **Descriptor priorities**--the prioritization of descriptors and their meta-descriptors preferably is supported by the description schemes so that queries may be processed more efficiently. The priorities may reflect levels of confidence or reliability. **Descriptor hierarchy**--suitable description schemes support the hierarchical representation of different descriptors and their meta-descriptors in order that queries may be processed more efficiently in successive levels where N level descriptors complement (N-1) level descriptors. **Descriptor scalability**--suitable description schemes support scalable descriptors with their meta-descriptors in order that queries may be processed more efficiently in successive description layers. **Description of temporal range**--association of

descriptors with their meta-descriptors to different temporal ranges are supported, both hierarchically (descriptors with their meta-descriptors are associated to the whole data or a temporal sub-set of it) as well as sequentially (descriptors with their meta-descriptors are successively associated to successive time periods). Description hierarchy (Col.11, lines 55-65).

As to claim 13, Vaithilingam teaches where multiple key feature are created and described

“ Functional requirements for descriptors and description schemes as proposed in the aforementioned MPEG-7 Requirements Document are supported by suitable descriptors and their meta-descriptors. Retrieval effectiveness--the effective retrieval of multimedia material is supported. Retrieval efficiency--the efficient retrieval of multimedia material is supported. Similarity-base retrieval--descriptions allowing to rank-order database content by the degree of similarity with the query are supported. Associated information--the association of other information with the data is supported. Streamed and stored descriptions--both (synchronized with content) and non

Functional requirements for descriptors and description schemes as proposed in the aforementioned MPEG-7 Requirements Document are supported by suitable descriptors and their meta-descriptors. Retrieval effectiveness--the effective retrieval of multimedia material is supported. Retrieval efficiency--the efficient retrieval of multimedia material is supported. Similarity-base retrieval--descriptions allowing to rank-order database content by the degree of similarity with the query are supported. Associated information--the association of other information with the data is supported. Streamed and stored descriptions—both Streamed (synchronized with content) and non Streamed data descriptions are supported.” (Col.12, lines 15-26).

With respect to claims 14-15 and 18, Vaithilingam teaches where multiple attachments to describe the feature indicative of event and object as well as the level of the feature created are used.

According to Vaithilingam “ During extraction, features from a multimedia content may be combined, if desired, with higher level semantic information to determine the values in the meta-descriptor. For example, where the multimedia content is an image, features from the image are combined with semantic information from the text caption associated with the image to determine the values in the meta-descriptor for the image.”

And further “ General requirements for descriptors and description schemes as proposed in the aforementioned MPEG-7 Requirements Document are supported by suitable descriptors and their meta-descriptors. Multiple types of features--suitable descriptors and their meta-descriptors support multimedia descriptions using various types of features such as: N-dimensional Spatio-temporal structure (e.g., the duration of a music segment), objective features (e.g., the number of beds in a hotel, color of an object, shape of an object, audio pitch, etc.), subjective features (e.g., how nice, happy or fat someone is, topic, style, etc.), production features (e.g., information about document creation such as the date of acquisition, producer, director, performers, roles, production company, production history, any non-IPMP production information), composition information (e.g., how a scene is composed, editing information, the user's preferences, etc.), and concepts (e.g., event, activity). Abstraction levels for the multimedia material--hierarchical mechanism to describe multimedia documents at different levels of abstraction are supported, (Col.11, lines 15-30).

Allowable Subject Matter

Claims 7, 9, 16, 17, and 19-26 are allowed.

Claims 2-6 and 10-12 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Daniel D. Abebe whose telephone number is 571-272-7615. The examiner can normally be reached on monday-friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Hudspeth can be reached on 571-272-7843. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Daniel Abebe Primary Examiner A.U. 2626

A handwritten signature in black ink, appearing to read 'Daniel Abebe', with a long horizontal flourish extending to the right.

August 22, 2006